

PT-025-2W-02

Portable All-in-One Tracking Turntable

This product is a two-dimensional tracking turntable, comprising an azimuth axis and a pitch axis to form a frame-type U/T structure. Its function is to provide high-precision pointing and tracking for moving platforms such as ships; when used in conjunction with user software, it enables the tracking of low-Earth orbit satellites.



Product Features

- Integrated design, lightweight unit
- Dual-axis with mechanical locking mechanism
- Infinite continuous rotation in azimuth
- Elevation range: -10° to $+80^{\circ}$
- High positioning accuracy of up to ± 5 seconds
- Ip65 waterproof rating

Suitable scenarios

Suitable for use in sectors such as security, defence and surveying, it can be used specifically with high-precision optoelectronic tracking equipment, radar or antennas that need to be carried, to enable target localisation and stable tracking.

Technical Specifications

Parameter categories	Parameter items	Parameter values
Accuracy Performance	Angular position accuracy	$\leq \pm 5''$
	Angular position repeatability	$\leq \pm 3''$
	Tracking/pointing accuracy	Infrared: $\leq 60''$ (RMS) Visible light: $\leq 30''$ (RMS)
	Rate stability	5×10^{-3} (averaged over 1°) 5×10^{-4} (averaged over 10°) 5×10^{-5} (averaged over 360°)
Dynamic Performance	Maximum angular velocity	Azimuth/Elevation: $0.1^\circ/\text{s}$ to $90^\circ/\text{s}$
	Maximum angular acceleration	Azimuth/Elevation: $\geq 60^\circ/\text{s}^2$
Range of Motion	Azimuth/elevation range	Azimuth: 360° continuous rotation Elevation: -10° to $+80^\circ$
Mechanical Specifications	Load capacity	25kg
	Table diameter/dimensions	$170\text{mm} \times 447\text{mm} \times 438\text{mm}$
Environmental Protection	Protection rating	Ip65
	Operating temperature	0°C to $+70^\circ\text{C}$
Power and Communications	Power supply requirements	External 28V DC, average power consumption $\leq 50\text{W}$
	Control interface	Rs422